Matthew S. Tejada, Ph.D. Executive Director Air Alliance Houston 2409 Commerce, Suite A Houston, Tx 77003-1503

Cruz Hinojosa, Jr.
Vice-President
Environmental Community Advocates
of Galena Park (ECAGP)
1721 16th Street
Galena Park, Tx 77547

Dear Misters Tejada and Hinojosa:

The Air Alliance and the ECAGP have been in discussions recently with the U.S. Environmental Protection Agency regarding the upland dredged material sites located adjacent to the Houston Ship Channel, specifically the Clinton Site and the House, Stimson, and Glendale Tracts. You have raised a number of concerns related to recreating on the site, drinking water from private and public wells in the area, fishing from natural on-site depressions, fishing downstream from the permitted discharge points, and storm water runoff flowing through the neighborhoods. You have requested our assistance in investigating the sites as possible public health concerns.

Because the dredged material sites in question are under the jurisdiction of the Port of Houston Authority and the U.S. Army Corps of Engineers, EPA is not in a position to respond fully to all of your questions. However, the attached fact sheet represents our responses and compiles

available information to address your concerns. Where EPA cannot fully respond to your concerns, the fact sheet includes contacts to assist you further. If you have any questions, please feel free to call me at 215.665.3110 or call William Honker at 214.665.3187.

Sincerely yours,

Samuel J. Coleman, Acting Regional Administrator

cc: General Kula, USACE ?Charlie Jenkins, PHA ?Aston Hinds, PHA

Attachments

Executive Summary for the
Upland Dredged Material Sites for the
Clinton Site and the House, Stimson, and Glendale Tracts
Located adjacent to the Houston Ship Channel
June 2012

Background: Jane/Karen The Port of Houston Authority owns the sites known as the Clinton Site and the House, Stimson, and Glendale Tracts. The U.S. Army Corps of Engineers, Galveston District, a primary user, places dredged materials at the sites as part of its government responsibility to maintain navigable waterways. The dredged material sites are not pits, landfills, or waste disposal sites. The dredged materials are not wastes typically subject to federal hazardous waste rules. Since the sites are located on land and not within waters of the United States, the EPA does not regulate or oversee the permitting, monitoring, operations, or maintenance of these dredged material sites.

The Port of Houston Authority manages the dredged disposal sites in accordance with its sediment management program. According to the Port of Houston Authority, the USACE selects the site and tests the dredged sediment prior to placing the dredge material at the site. The Port of Houston Authority evaluates the sediment data to determine whether the sediment is acceptable for placement at the site. If data are below the established Port of Houston Authority sediment criteria, the placement of the dredged material at the site may proceed.

Community Concerns

- 1. <u>Drinking Water</u>: Blake Galena Park and Jacinto City have public water wells using groundwater that are in close proximity to the Clinton Site. Working with TCEQ, Region 6 located four public water wells: one serving Galena Park, one for the Galena Independent School District, and two serving Jacinto City. Both Galena Park and Jacinto City purchase surface water from the City of Houston and have backup wells in the distribution systems (Blake -- do any of the backup wells supply groundwater? If so, what percentage is gw?). The Galena Park drinking water well, while located within ½ mile of the Clinton Site, is located inside a levy where storm water runoff does not affect it. Galena Park ISD public water supply is 100% groundwater. Given the well depths, annular cement depths, and confining layer depths, Texas classifies the public drinking water wells as low risk to potential sources of contamination. Further, past monitoring results of the wells show no detected regulated contaminates. Region 6 compiled its findings. See Attachment 1.
- 2. <u>Fishing</u>: Jane Is it safe to fish on the dredge sites or downstream from the discharge at the Clinton dredged material site? The Texas Department of State Health Services internet page lists four fish consumption advisories as follows:
 - ADV 35, issued July 8, 2008, for all catfish species and spotted seatrout in Galveston Bay including Chocolate Bay, East Bay, West Bay, trinity Bay and Contiguous waters, says "persons should limit consumption of catfish and spotted seatrout form this area to no more than one eight-ounce meal per month. Women who are nursing, pregnant or

who may become pregnant and children should not consume catfish or spotted seatrout from these waters."

- ADV 28, issued January 27, 2005, for spotted seatrout in the Houston Ship Channel including the tidal portion of the San Jacinto River below the U.S. Highway 90 bridge, Tabbs Bay, and all contiguous waters and Upper Galveston Bay north of a line drawn from Red Bluff Point to Five mile Cute Marker to Houston Point, says "persons should limit consumption of spotted seatrout from this area to no more than one eight-ounce meal per month. Women who are nursing, pregnant, or who may become pregnant and children should not consume spotted seatrout from these waters."
- ADV 20, issued October 9, 2001, for all species of fish in the Houston Ship Channel upstream of the Lynchburg Ferry crossing and all contiguous waters, including the San Jacinto River below the U.S. Highway 90 bridge, says "persons should limit consumption of all fish species from this area to no more than one eight-ounce meal per month. Women who are nursing, pregnant, or who may become pregnant and children should not consume any species of fish from these waters."
- ADV 3, issued September 19,1990, for catfish and blue crabs in the Houston Ship
 Channel and all contiguous waters, and upper Galveston Bay north of a line drawn from
 Red Bluff Point to Five Mile Cut Marker to Houston Point, says you should consume "A.
 No more than one meal, not to exceed eight ounces, each month. B. Women of childbearing age and children should not consume any catfish or blue crabs from this area."

Based on the extensive fish advisories posted by Texas, EPA strongly recommends observance of the limited consumption levels for all affected fish species. The Texas Advisories do not specifically mention fishing on the dredged material sites; however, since the dredge material comes from the Houston Ship Channel, EPA suggests it would be protective to apply the Texas Advisories to fishing on the dredged material sites. Fishing for sport only (without consumption) should follow appropriate water and boating safety rules. Region 6 compiled its findings. See Attachment 2.

Access additional information on fish consumption advisories and bans at http://www.dshs.state.tx.us/seafood/survey.shtm

- 3. <u>Regulations</u>: Jane/Karen The Marine Protection Research Sanctuaries Act (MPRSA, aka, the Ocean Dumping Act) is the primary Federal environmental statute governing transportation of dredged material for the purpose of disposal into ocean waters, while the Clean Water Act (CWA) Section 404 governs the discharge of dredged or fill material into "waters of the United States."
 - The MPRSA regulates disposal of dredged material into ocean waters including waters of
 the territorial seas, contiguous zone, and waters beyond the contiguous zone. Permits for
 ocean dumping of dredged material are subject to EPA review and concurrence. The
 EPA is also responsible for designating recommended ocean disposal sites for dredged
 material. In the Galveston Bay, the EPA permits an Ocean Dredged Material Disposal
 Site located at xxxxxxx.
 - The CWA Section 404 regulates the discharge of dredged material as fill into jurisdictional waters of the U.S., like wetlands, rivers, and streams not ocean waters.

CWA Section 404 permits are subject to EPA review and 404(c) "veto" if EPA's environmental guidelines are not met.

Under the MPRSA and the CWA Section 404, the USACE is the permitting authority for the proposed disposal of dredged material. EPA has the lead for establishing the environmental guidelines/criteria that must be met to receive a permit under the NPRSA and the CWA section 404

Access additional information on the MPRSA and CWA Section 404 at http://water.epa.gov/type/oceb/oceandumping/dredgedmaterial/dredgemgmt.cfm

Upland dredged material areas, such as the Clinton Site and the House, Stimson, and Glendale Tracts, are not aquatic environments, and therefore placement of dredged materials does not trigger the MPRSA or the CWA Section 404. A CWA section 401 water quality certification from the Texas Commission on Environmental Quality (TCEQ) covers the effluent or return water from the upland dredged disposal area. The USACE Nationwide Permit 16 Decision Document, issued February 13, 2012, satisfies "the technical requirement for a section 404 permit for the return water where the quality of the return water is controlled by the state through the section 401certification procedures."

4. <u>Safety</u>: Jane/KarenIs it safe to recreate on the Clinton Site? Typical on-site activities include picnicking, walking, horseback riding, cycling, fishing from natural on-site depressions, and other general trespassing. The EPA advises the public to adhere to the posted "No Trespassing" signs. As a federally permitted facility, the Clinton Site receives dredge material from the Houston Ship Channel. The nature of the dredge material could present physical trip-and-fall hazards and exposed sharp objects. Trespassing could put people in contact with harmful reptiles or other wildlife. Fishing for consumption from any ponds on-site or directly downstream of the site is strongly discouraged due to the Fishing Advisories posted by Texas. The Clinton Site is not a public park or a place designed to recreate. Questions about the site should be directed to XXXXXXXXXXX, Port of Houston Authority, 111 East Loop North, Houston, Texas 77029, Phone – 713.670.2400, Mail – PO Box 2562, Houston, TX 77252-2562.

Access additional information about the Port of Houston Authority at http://www.portofhouston.com/inside-the-port-authority

- 5. <u>Human Health</u>: In or around October 2011, the Port of Houston Authority provided Air Alliance with a summary of historical data and five complete sediment reports for "recent placement" activities at the Clinton Site and the House-Stimson Site. The Port concluded that the analytical results for more than 60 required parameters were below its sediment criteria. Questions regarding the following may be directed to the Port of Houston Authority:
 - 1. What oversight is in place to ensure no health risks to neighbors?
 - 2. Since the Sites are unlined, what groundwater monitoring is done to ensure contaminated plumes do not migrate off-site? How are private wells for drinking water protected from potential contaminated plume migration?
 - 3. What are the levels of dioxin and PCBs at the sites?
 - 4. Will pollutants migrate off-site? If so, what monitoring is done to ensure no migration of pollutants by air, soil, or water off-site?

- 5. Are levels of dioxin and PCBs in the sites a risk for human exposure in the adjacent neighborhoods?
- 6. Storm Water Runoff at the Clinton Site: Wren/USACEWill pollutants migrate off-site through storm water? According to the USACE, the levees are typically built with either clay mined from within the placement areas or from clay mined from the navigation channel. Clay is the best construction material. The clay used in the levees is not expected to be physically or chemically contaminated because of the chemistry of the clay particles. Therefore, storm water runoff from the levees should not transport contamination from the Site into the neighborhoods. Across the site, storm water enters an on-site collection system that conveys it to the permitted discharge point, in accordance with the USACE National Wide Permit, which covers both the return water (drainage from the wet sediment) and storm water runoff.

Access additional information on the National Wide Permit 16 at http://www.usace.army.mil/Portals/2/docs/civilworks/nwp/2012/NWP 16 2012.pdf

- 7. Sediment Data: EPA has considered your request to review the 2007-2011 USACE reports and sediment data collected prior to dredging and destined for Lost Lake, Rosa Allen, and House dredged material sites. It is our understanding that the purpose of the assessment was to evaluate the impacts of placement of this material in upland dredge material placement areas near residential areas. Unfortunately, the reports evaluated do not provide an adequate data set to carry out this type of evaluation. An evaluation of the data set would require unreasonable assumptions that would severely limit the usefulness of the evaluation.
- 8. Assessments of the Clinton Site and the House, Stimson, and Glendale Tracts: Since January 2011, the Environmental Community of Advocates of Galena Park and the Air Alliance submitted three requests for EPA to investigate and assess the Clinton Site and the House, Stimson, and Glendale Tracts. Since these sites are under the ownership of POHA and material was placed under the federal permitting authority of the USACE, they are generally exempt from CERCLA liability; therefore, any assessment of the sites should be addressed through the respective federal program that authorized the discharge. EPA has notified the USACE of your request for assessments of these sites.
- 8. Dioxin: Brian Mueller TMDL for the HSC and the Galveston Bay

Superfund San Jacinto River Waste Pits Site

SF Patrick's Bayou Site

SF Dioxin Finger printing study

Dr. Hanadi S. Rifai -- Dr. Rifai, from the University of Houston, is conducting research on water quality in the Houston Ship Channel along the Buffalo Bayou, Houston Ship Channel and Galveston Bay. Testing includes Physical, Chemical and Biological parameters and fish tissue. The analytical results are available in the public domain at the Civil Engineering Department. The Concerned Citizens from the Galena Park asked Dr. Rifai to sample the dredged sediments

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Deleted: The data represents sediment and placement as follows: HSC sediment from Carpenter Bayou to Greens Bayou was placed in Lost Lake, the HSC sediment from Greens Bayou to Sims Bayou was placed in Rosa Allen, and the HSC sediment from Sims Bayou to Turning Basin and LD (?) was placed in House. XXXX

Deleted: Superfund

Deleted: The Superfund program has listed two sites in the Houston Ship Channel to the National Priorities List to include the San Jacinto Waste Pits and the Patrick's Bayou. Texas identified both sites for dioxin sediment in the Houston Ship Channel.

deposited at the Clinton Dredge Material Site and other sites in Galena Park/San Jacinto area, but Dr. Rifai indicates the USACE refused to give her access to the site. Dr. Rifai is Professor of Civil Engineering, Director of Environmental Engineering, Graduate Program, and can be reached at the University of Houston Department of Civil and Environmental Engineering, Cullen College of Engineering, N107 Engineering Building 1, Houston, TX 77204-4003, Phone: 713-743-4721 | Fax: 713-743-4260 | rifai@uh.edu

Attachment 1 - Blake PWS in the Galena Park and Jacinto City

Attachment 2 - Jane Fish Advisories in the Houston Ship Channel and Galveston Bay

Attachment 3 – All Past Activities – please add any pertinent letters, meetings, coordination

June 5, 2012 - Call with Air Alliance, EPA and USACE

April 29, 2012 - Call with USACE and Houston Port Authority

April 18, 2012 – Honker letter to USACE and PHA transferring concerns and questions identified by the Air Alliance, asking for direct response to Cecilia Dykes

March 14, 2012 - Call with Air Alliance

March 12, 2012 - Email from Cecile Dykes on status of data review

Feb 2012 – EPA requested TCEQ analyze data based on their regulatory criteria

January 2012 – USACE 2008-2011 Houston Ship Channel sediment data from Carpenter's Bayou up to the Turning Basin and LD received from Air Alliance

October 21, 2011 – Flores Letter to Air Alliance to clarify EPA's jurisdictional roles and best path forward with TCEQ, PHA, USACE for future correspondence and concerns.

July 21, 2011 – EPA clarifies to Air Alliance that EPA will continue to work with PHA and USACE towards evaluating their concerns.

September 15, 2011 – Air Alliance letter to Flores saying PHA says the data is below the sediment criteria threshold; however, Air Alliance stated that PHA letter did not address some of their concerns. Air Alliance wants to work with EPA to determine any health risk from the dredge placement tracts.

July 5, 2012 – EPA letter to USACE requesting 5 years of sediment data collected prior to upland disposal.

June 21, 2011 – Flores Letter to Air Alliance re upland sites, collectively called Galena Park Area Sites, POH sent EPA letter describing historic use; USACE gets to use the sites, but must conduct sediment testing prior to placing any dredge material. EPA working with USACE and POH to address citizen concerns.

May 19, 2011 – Air Alliance letter to Flores: still concerned with upland disposal sites, asking "EPA to seriously consider our request for an assessment of the Clinton, House, Stimson, and Glendale Sites.

Mid April 2011 - meeting with EPA, TCEQ, PHA, USACE

April 12, 2011 – Port of Houston letter to Flores and ECAGP explaining sediment sampling requirements and conclusion of data. PHA stated test result for any constituents identified were below PHA sediment criteria thresholds.

March 2011 -Port of Houston sent data disc received from ECAGP to Port

February 18, 2011 – Flores letter to Deidre Wright, Environmental Community Advocates of Galena Park: EPA is reviewing data you provided, which "will help us evaluate any potential environmental impacts to Galena Park, Jacinto City and Pleasantville."

January 31, 2011 -- ECAGP letter to Flores, requesting EPA investigate upland disposal areas, in particular, the Clinton Dredge Material Site and the House, Stimson and Glendale Tracts.